

Table B-1. Survey of Industrial Research and Development---number of companies in the target population and selected for the sample, by industry and by size of company: 1999

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Industry and size of company	NAICS codes	Companies in target population	1999 survey			Companies with reported or imputed 'R&D expenditures for 1999' ^{3,4}		Companies that reported no R&D expenditures for 1999 ⁵
			Companies selected for 1,999 sample	Non-certainties ¹	Certainties ²	Greater than or equal to \$5 million	Less than \$5 million	
Distribution by industry:								
All industries.....	21-23, 31-33, 42, 44-81	1,854,218	24,431	21,791	2,640	1,808	1,863	16,612
Manufacturing.....	31-33	181,085	4,933	3,573	1,360	973	1,009	2,225
Food.....	311	2,500	166	106	60	35	55	56
Beverage and tobacco products.....	312	267	13	8	5	3	3	6
Textiles, apparel, and leather.....	313-16	3,428	226	156	70	13	66	104
Wood products.....	321	1,702	296	265	31	3	35	217
Paper, printing and support activities.....	322, 323	3,552	138	97	41	31	22	72
Petroleum and coal products.....	324	152	22	10	12	8	4	7
Chemicals.....	325	1,388	300	108	192	144	84	36
Basic chemicals.....	3251	227	155	65	90	46	55	29
Resin, synthetic rubber, fibers, and filament.....	3252	107	16	2	14	14	0	0
Pharmaceuticals and medicines.....	3254	300	53	6	47	45	4	1
Other chemicals.....	325 (minus 3251-52, 3254)	754	76	35	41	39	25	6
Plastics and rubber products.....	326	2,737	337	235	102	52	109	113
Nonmetallic mineral products.....	327	1,268	49	31	18	11	15	17
Primary metals.....	331	1,109	104	65	39	22	32	38
Fabricated metal products.....	332	5,853	358	257	101	36	134	140
Machinery.....	333	3,702	338	223	115	114	105	78
Computer and electronic products.....	334	2,749	427	125	302	300	53	31
Computers and peripheral equipment.....	3341	249	63	24	39	42	9	3
Communications equipment.....	3342	413	84	23	61	59	7	4
Semiconductor and other electronic components.....	3344	1,193	137	44	93	95	15	15
Navigational, measuring, electromedical, and control instruments.....	3345	736	115	20	95	93	13	5
Other computer and electronic products.....	334 (minus 3341-42, 3344-45)	158	28	14	14	11	9	4

See explanatory information and SOURCE at end of table.

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			Companies selected for 1,999 sample	Non-certainties ¹	Certainties ²	Greater than or equal to \$5 million	Less than \$5 million	
Distribution by industry:								
Electrical equipment, appliances, and components.....	335	1,049	161	102	59	53	50	31
Transportation equipment.....	336	2,054	145	64	81	77	17	35
Motor vehicles, trailers, and parts.....	3361-63	1,400	64	29	35	37	4	16
Aerospace products and parts.....	3364	269	29	5	24	24	0	4
Other transportation equipment.....	336 (minus 3361-64)	385	52	30	22	16	13	15
Furniture and related products.....	337	1,570	93	58	35	10	31	43
Miscellaneous manufacturing.....	339	1,969	317	222	95	59	101	112
Medical equipment and supplies.....	3391	589	118	70	48	43	34	22
Other miscellaneous manufacturing.....	339 (minus 3391)	1,380	199	152	47	16	67	90
Other manufacturing ⁵	31-33 (minus 311-16, 321-27, 331-37, 339)	--	--	--	--	--	--	--
Small manufacturing companies ⁶	Fewer than 50 employees	144,036	1,443	1,441	2	2	93	1,090
Nonmanufacturing.....	21-23, 42, 44-81	1,673,133	19,498	18,218	1,280	835	854	14,387
Mining, extraction, and support activities.....	21	3,241	85	70	15	13	8	52
Utilities.....	22	571	66	34	32	9	32	18
Construction.....	23	73,991	1,493	1,486	7	6	13	1,263
Trade.....	42, 44, 45	146,369	3,062	2,953	109	98	58	2,474
Transportation and warehousing.....	48, 49	21,380	456	439	17	3	12	364
Information.....	51	12,029	674	470	204	189	100	267
Publishing.....	511	5,321	410	268	142	155	83	103
Newspaper, periodical, book, and database.....	5111	3,324	81	73	8	6	4	59
Software.....	5112	1,997	329	195	134	149	79	44
Broadcasting and telecommunications.....	513	3,524	132	99	33	15	4	84

See explanatory information and SOURCE at end of table.

Table B-1. **Survey of Industrial Research and Development---number of companies in the target population and selected for the sample, by industry and by size of company: 1999**

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Industry and size of company	NAICS codes	Companies in target population	1999 survey			Companies with reported or imputed 'R&D expenditures for 1999' ^{a,4}		Companies that reported no R&D expenditures for 1999 ⁵
			Companies selected for 1,999 sample	Non-certainties ¹	Certainties ²	Greater than or equal to \$5 million	Less than \$5 million	
Distribution by industry:								
Radio and television broadcasting.....	5131	1,723	37	35	2	2	1	26
Telecommunications.....	5133	1,465	42	30	12	11	1	21
Other broadcasting and telecommunications.....	513 (minus 5131, 5133)	336	53	34	19	2	2	37
Other information.....	51 (minus 511, 513)	3,184	132	103	29	19	13	80
Finance, insurance, and real estate.....	52, 53	38,021	863	810	53	33	15	693
Professional, scientific, and technical services.....	54	49,843	3,464	2,734	730	456	510	1,900
Architectural, engineering, and related services.....	5413	11,182	906	719	187	68	96	634
Computer systems design and related services.....	5415	6,243	1,297	1,026	271	114	279	583
Scientific R&D services.....	5417	1,402	519	286	233	262	113	71
Other professional, scientific, and technical services.....	54 (minus 5413, 5415, 5417)	31,016	742	703	39	12	22	612
Management of companies and enterprises.....	55	571	106	75	31	3	6	72
Health care services.....	621-23	43,379	894	885	9	2	11	746
Other nonmanufacturing	56, 61, 624, 71, 72, 81	180,093	3,877	3,811	66	18	50	2,979
Small nonmanufacturing companies ⁶	Fewer than 15 employees	1,103,645	4,458	4,451	7	5	39	3,560

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			Companies selected for 1,999 sample	Non-certainties ¹	Certainties ²	Greater than or equal to \$5 million	Less than \$5 million	
Distribution by size of company: [Number of employees]								
Total.....		1,854,218	24,431	21,791	2,640	1,808	1,863	16,612
5 to 24.....		1,462,627	10,725	10,681	44	9	249	NA
25 to 49.....		212,837	4,490	4,437	53	45	244	NA
50 to 99.....		99,234	2,882	2,759	123	134	267	NA
100 to 249.....		52,087	2,341	2,054	287	243	328	NA
250 to 499.....		14,334	1,022	705	317	210	206	NA
500 to 999.....		6,422	847	450	397	226	218	NA
1,000 to 4,999.....		5,140	1,287	487	800	487	257	NA
5,000 to 9,999.....		757	362	94	268	212	44	NA
10,000 to 24,999.....		481	263	55	208	139	40	NA
25,000 or more.....		299	212	69	143	103	9	NA

¹ Noncertainties are companies whose probability of selection is less than one.

² Certainties are companies whose probability of selection is one. This includes companies whose 1998 R&D expenditures were equal to or greater than \$5 million.

³ Includes RD-1 companies for which total R&D expenditure data were imputed.

⁴ Does not include companies that did not respond to the survey or that did not indicate any information about R&D performance on a returned questionnaire. Also excludes companies that reported they were out-of-scope, out-of-business, or had merged with another company.

⁵ "Other manufacturing" is intentionally left blank to allow for possible future North American Industry Classification System (NAICS) expansion.

⁶ The frame from which the statistical sample was selected was divided into two partitions based on total company employment. In the manufacturing sector, companies with employment of 50 or more were included in the large company partition. In the nonmanufacturing sector, companies with employment of 15 or more were included in the large company partition. Companies in the respective sectors with employment below these values, but with at least 5 employees, were included in the small company partition. The purpose of partitioning the sample this way was to reduce the variability in industry estimates largely attributed to the random year-to-year selection of small companies by industry and the high sampling weights that sometimes were assigned to them. Because of this, detailed industry statistics were possible only from the large company partition; detailed industry statistics from the small company partition were not possible. Statistics from the small company partition are shown separately and are included in manufacturing, nonmanufacturing, and all industries totals. For more detailed information, please see "frame creation" and "sample selection" in Section B.

KEY: -- = Indicates data not collected.

NA = Not available.

NOTE: Starting with the 1999 survey, estimates are based on the North American Industry Classification System (NAICS). In prior years, estimates were based on the Standard Industrial Classification (SIC) system.

SOURCE: National Science Foundation/Division of Science Resources Statistics, Survey of Industrial Research and Development: 1999